

Work Order ID 107379

September-23-13 11:49:37 AM

107379

Page 1

Item ID: D4022-041

Accept

N900040100

Setup

Start

NS1

Revision ID:

Item Name: Fuel Transfer Pump Assy

3

Accept

N900040100

Setup

NS1

Start Date: 9/23/13 Start Qty: 2.00

2

Cust Item ID:

Required Date: 9/23/13 Req'd Qty: 2.00

2

Customer:

Reference:

Approvals: Process Plan: MUS

Date: 13-09-24

Tooling:

Date:

Run

Start

NR1

QC:

Date:

SPC (Y/N):

Date:

Stop

NR2

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	---------------	---------------	------------------	----------------

Draw Nbr	Revision Nbr								
D4022	C								
100		0.00							
100									
Small Fab	Memo	0.00							
Small Fab	Assemble as per dwg D4022								
	Metal set A4 batch: M116143								
	O-ring Lub as per dwg batch: M118340								
110	QC5- Inspect part completeness to step on W/O	0.00	DAS						
110			27						
QC	Memo		9-89						
Quality Control		0.00	13-10-29						

NCR: Yes / No

DQA: _____ Date: _____

WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order: _____			DISPOSITION			AGAINST DEPARTMENT/PROCESS						
			Rework <input type="checkbox"/> Scrap <input type="checkbox"/> Use-as-is <input type="checkbox"/> Work Order Update <input type="checkbox"/>	Skid-tube <input type="checkbox"/> Machining <input type="checkbox"/> Thermoforming <input type="checkbox"/> Large Fab <input type="checkbox"/>	Crosstube <input type="checkbox"/> Small Fab <input type="checkbox"/> Finishing <input type="checkbox"/> Composite <input type="checkbox"/>	Water Jet <input type="checkbox"/> Prod. Eng. Coor. <input type="checkbox"/> Rec/Store/Packaging <input type="checkbox"/> Supplier <input type="checkbox"/>	Engineering <input type="checkbox"/> Quality <input type="checkbox"/> Other <input type="checkbox"/>					
Root Cause	Date	Step	Qty	Description of work order update or Non-conformance		Initial Chief Eng	Action Description		Sign & Date	Verification	QC Inspector	
Doc/Data <input type="checkbox"/> Equip/Tooling <input type="checkbox"/> Operator <input type="checkbox"/> Material <input type="checkbox"/> Setup <input type="checkbox"/> Other <input type="checkbox"/> Process <input type="checkbox"/> Supplier <input type="checkbox"/> Training <input type="checkbox"/> Unapproved <input type="checkbox"/>												
FAULT CATEGORY												
Landing Gear <input type="checkbox"/> Bending <input type="checkbox"/> Centre Not Concentric to O/S <input type="checkbox"/> Cracks <input type="checkbox"/> Crushed/Crimped <input type="checkbox"/> Cuffs <input type="checkbox"/> Heat Treat <input type="checkbox"/> Inspection Strip in Tube <input type="checkbox"/> Ripples in Bend <input type="checkbox"/> Torque Waves in Extrusion <input type="checkbox"/> Turning Sequence <input type="checkbox"/> Wave/Twist in Tube				General <input type="checkbox"/> Bend <input type="checkbox"/> BOM/Route <input type="checkbox"/> Broken/Damaged <input type="checkbox"/> Burrs <input type="checkbox"/> Contamination <input type="checkbox"/> Countersink <input type="checkbox"/> Cut Too Short <input type="checkbox"/> Drill Holes <input type="checkbox"/> Drawing <input type="checkbox"/> Finish <input type="checkbox"/> Folio			<input type="checkbox"/> Grain <input type="checkbox"/> Hardware <input type="checkbox"/> Inspection Incomplete <input type="checkbox"/> Instructions Incomplete/Unclear <input type="checkbox"/> Maintenance <input type="checkbox"/> Mislabeled <input type="checkbox"/> Misread <input type="checkbox"/> Offset <input type="checkbox"/> Out of Calibration <input type="checkbox"/> Out of Sequence <input type="checkbox"/> Outside Dimensions				<input type="checkbox"/> Ovalized <input type="checkbox"/> Over/Under tolerance <input type="checkbox"/> Part Incorrect <input type="checkbox"/> Part Lost/Missing <input type="checkbox"/> Part Moved <input type="checkbox"/> Positioned Wrong <input type="checkbox"/> Power Loss/Surge <input type="checkbox"/> Pressure/Forced <input type="checkbox"/> Temperature/Cure <input type="checkbox"/> Weld <input type="checkbox"/> Wrong Stock Pulled <input type="checkbox"/> Other	

Work Order ID 107379

107379

Page 2

September-23-13 11:49:37 AM

Item ID: D4022-041

Accept

N900040100

Setup

Start

NS1

Revision ID:

Item Name: Fuel Transfer Pump Assy

Stop

NS2

Start Date: 9/23/13 Start Qty: 2.00

2

Cust Item ID:

Required Date: 9/23/13 Req'd Qty: 2.00

2

Customer:

Reference:

Approvals: Process Plan:

Date:

Tooling:

Date:

Run

Start

NR1

QC:

Date:

SPC (Y/N):

Date:

Stop

NR2

Sequence ID/
Work Center ID

Operation
Description

Set Up/
Run Hours

Tool ID

Tool #

Plan
Code

Accept
Qty

Reject
Qty

Reject
Number

Insp.
Stamp

120

120

Packaging

Packaging

Identify as per dwg & Stock Location:

0.00

DAS

3 13/10/29

32

9.89

Memo

SJ101C

0.00

130

130

QC

Quality Control

QC21- Final Inspection - Work Order Release

0.00

Rm 13/10/29 / /

MF

13-10-29

NCR: Yes / No

DQA: Date:

WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Picklist Print

September-23-13 11:49:36 AM

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Work Order ID: 107379

Parent Item: D4022-041

Parent Item Name: Fuel Transfer Pump Assy

Start Date: 9/23/13

Required Date: 9/23/13

Start Qty: 2.00

Required Qty: 2.00

Comments: IPP rev A 10.02.02 new issue Prelim EC verified by:DD IPP Rev:B 10.05.17 as per ECN10-562 DD verf:EC IPP REV:C 11.11.22 PER ECN11-665 DD VERF:EC IPP REV:D 12.02.08 replace AN818-6D for AN815-6D DD VERF:JLM

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
D4022-1 Fuel Transfer Pump		Manufactured	No	106519		100	Each	5.0000	1	2	3	FF	13-10-25
							<u>Location</u>	<u>Loc Qty</u>	<u>Loc Code</u>				
				GA			5						
				106519			5						
D4022-5 Thermal Switch		Manufactured	No			100	Each	9.0000	1	2		FF	13-10-25
							<u>Location</u>	<u>Loc Qty</u>	<u>Loc Code</u>				
				ST242A			9						
				106517			9						
AN815-6D Union-M-Flare		Purchased	No			100	Each	26.0000	2	4	5	FF	13-10-25
							<u>Location</u>	<u>Loc Qty</u>	<u>Loc Code</u>				
				ST347	127044		25						
					m126176		25						
				ST348			1						
					124097		1						
MS29512-06 O-RING		Purchased	No			100	Each	38.0000	2	4	6	FF	13-10-25
							<u>Location</u>	<u>Loc Qty</u>	<u>Loc Code</u>				
				ST309	127	172	38						
							123968	4					
							125445	14					
							m126475	20					

NCR: Yes / No

DOA: _____ Date: _____

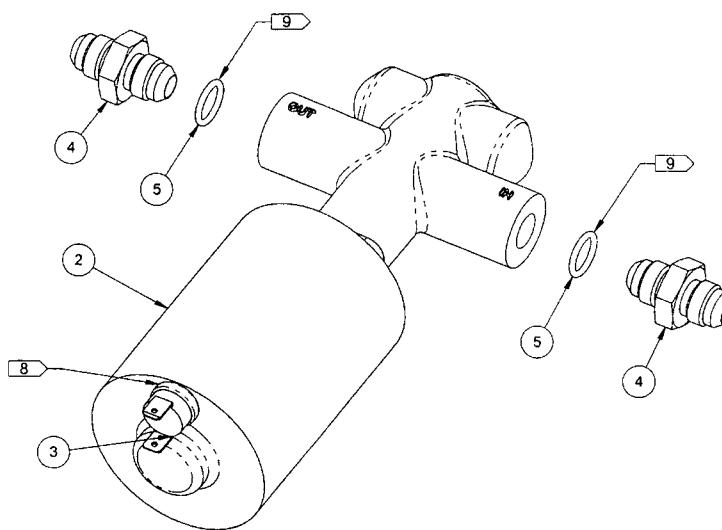
WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: _____ Date: _____

Work Order: _____			DISPOSITION			AGAINST DEPARTMENT/PROCESS															
			Rework <input type="checkbox"/>	Scrap <input type="checkbox"/>	Use-as-is <input type="checkbox"/>	Work Order Update <input type="checkbox"/>	Skid-tube <input type="checkbox"/>	Machining <input type="checkbox"/>	Thermoforming <input type="checkbox"/>	Large Fab <input type="checkbox"/>	Crosstube <input type="checkbox"/>	Small Fab <input type="checkbox"/>	Finishing <input type="checkbox"/>	Composite <input type="checkbox"/>	Water Jet <input type="checkbox"/>	Prod. Eng. Coor. <input type="checkbox"/>	Rec/Store/Packaging <input type="checkbox"/>	Supplier <input type="checkbox"/>	Engineering <input type="checkbox"/>	Quality <input type="checkbox"/>	Other <input type="checkbox"/>
Root Cause	Date	Step	Qty	Description of work order update or Non-conformance			Initial Chief Eng	Action Description			Sign & Date	Verification		QC Inspector							
Doc/Data																					
Equip/Tooling																					
Operator																					
Material																					
Setup																					
Other																					
Process																					
Supplier																					
Training																					
Unapproved																					
FAULT CATEGORY																					
Landing Gear				General																	
Bending		Bend		Grain		Ovalized		Pressure/Forced		Temperature/Cure		Weld		Wrong Stock Pulled							
Centre Not Concentric to O/S		BOM/Route		Hardware		Over/Under tolerance		Part Incorrect		Part Lost/Missing		Part Moved		Positioned Wrong							
Cracks		Broken/Damaged		Inspection Incomplete		Part Moved		Power Loss/Surge		Power Loss/Surge		Other									
Crushed/Crimped		Burrs		Instructions Incomplete/Unclear		Offset															
Cuffs		Contamination		Maintenance		Out of Calibration															
Heat Treat		Countersink		Mislabeled		Out of Sequence															
Inspection Strip in Tube		Cut Too Short		Misread		Outside Dimensions															
Ripples in Bend		Drill Holes																			
Torque Waves in Extrusion		Drawing																			
Turning Sequence		Finish																			
Wave/Twist in Tube		Folio																			

ITEM NO.	QTY. -041	PART NUMBER	DESCRIPTION	JOHN CAMERON AVIATION PART NUMBER
1	X	D4022-041	FUEL TRANSFER PUMP ASSEMBLY	A8150-B1-JCA
2	1	D4022-1	FUEL TRANSFER PUMP	
3	1	D4022-5	THERMAL SWITCH	
4	2	AN815-6D	FITTING, UNION	
5	2	MS29512-06	O RING	

A



107379 MLJ
13-09-24

D4022-041 FUEL TRANSFER PUMP ASSEMBLY

107379 MLJ
2012-03-02

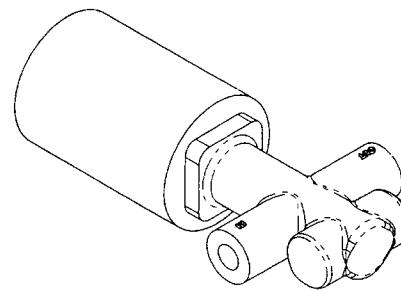
NOTES:

- 1) MATERIAL: N/A
- 2) FINISH: N/A
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: IDENTIFY PER QSI 044 6.1
- 7) WEIGHT: 2.61 lbs
- 8) ATTACH D4022-5 THERMAL SWITCH TO D4022-1 FUEL PUMP IN LOCATION SHOWN USING METALSET A4
- 9) LUBRICATE O-RING WITH ULTRACHEM ASSEMBLY FLUID #1, FUEL-LUBE, MOLYKOTE 55 O-RING GREASE OR EQUIVALENT

C	CORRECTED TYPO: AN815-6D WAS AN818-6D, ZN D7-1. CORRECTED SPELLING OF "AEROSPARES", ZN BS-3.	DC	12.02.09
B	CORRECTED SPELLING OF "AEROSPARES". REF CAR 11-50.	DC	11.09.28
A	NEW ISSUE	HS	10.04.16
REV.	DESCRIPTION		
DESIGN	<i>AS</i>	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	<i>DC</i>	DRAWING NO.	REV. C
CHECKED	<i>AS</i>	D4022	SHEET 1 OF 4
MFG. APPR.		APPROVED	SCALE
DE APPR.	<i>AS</i>	TITLE FUEL PUMP NTS	
DATE	12.02.09	COPYRIGHT © 2010 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR DISSEMINATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD	

DART AEROSPACE PART NUMBER	JOHN CAMERON AVIATION PART NUMBER
D4022-1	REF JCA/M47/D3/SHT 13

SPECIFICATION CONTROL DRAWING



DART PART NUMBER	SUPPLIER	SUPPLIER PART NUMBER	OPERATING VOLTAGE	FLOW (GPH)	OUTPUT PRESSURE (PSI)	TEMPERATURE RANGE
D4022-1	WELDON	A8150-B1	24 VDC	35 - 50	5 - 25	-65°F TO +185°F
	AEROSPARES ACCESSORIES	A8150-B1	24 VDC	35 - 50	5 - 25	-65°F TO +185°F

D4022-X FUEL TRANSFER PUMP

RELEASED
2012-03-02
NP

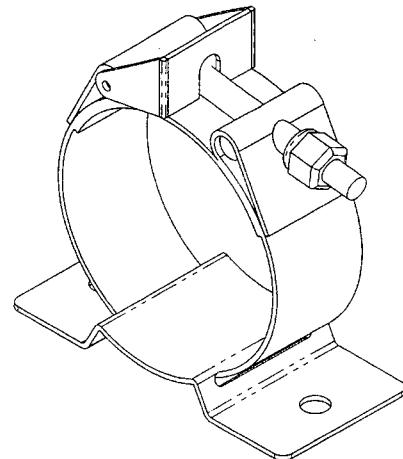
NOTES:

- 1) MATERIAL: N/A
- 2) FINISH: N/A
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: N/A
- 7) WEIGHT: 2.6 lbs

DESIGN	AB	DART AEROSPACE LTD	
DRAWN	PC	HAWKESBURY, ONTARIO, CANADA	
CHECKED	BS	DRAWING NO. D4022	
MFG. APPR.		REV. C SHEET 2 OF 4	
APPROVED	MM	TITLE FUEL PUMP	
DE APPR.	MM	SCALE NTS	
DATE	12.02.09	COPYRIGHT © 2010 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY OTHER PURPOSE OR COPIED OR DISCLOSED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD	

DART AEROSPACE PART NUMBER	JOHN CAMERON AVIATION PART NUMBER
D4022-3	REF JCA/M47/D3/SHT 13

SPECIFICATION CONTROL DRAWING



DART PART NUMBER	POSSIBLE SUPPLIER	SUPPLIER PART NUMBER	MATERIAL	FITS MOTOR SIZE (\varnothing)
D4022-3	WELDON	TC 250-100	STAINLESS STEEL	2.5
	AIRCRAFT SPRUCE AND SPECIALTY	05-00021	STAINLESS STEEL	2.5
	AEROSPARES ACCESSORIES	TC 250-100	STAINLESS STEEL	2.5

C

D4022-X FUEL PUMP MOUNTING BRACKET

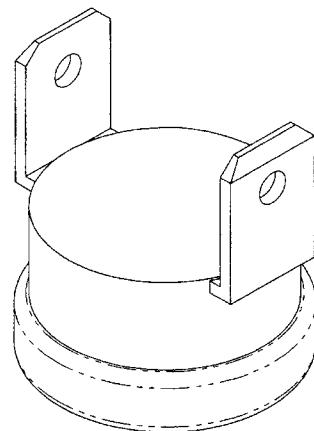
2012-03-02
JP

NOTES:
 1) MATERIAL: N/A
 2) FINISH: N/A
 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
 4) UNITS: INCHES UNLESS OTHERWISE NOTED
 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
 6) IDENTIFICATION: N/A

DESIGN	<i>AS</i>	DART AEROSPACE LTD	
DRAWN	<i>DC</i>	HAWKESBURY, ONTARIO, CANADA	
CHECKED	<i>AS</i>	DRAWING NO.	REV. C
MFG. APPR.		D4022	SHEET 3 OF 4
APPROVED	<i>JP</i>	TITLE	SCALE
DE APPR.	<i>JP</i>	FUEL PUMP	NTS
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DART AEROSPACE PART NUMBER	JOHN CAMERON AVIATION PART NUMBER
D4022-5	REF JCA/M47/D3/SHT 13

SPECIFICATION CONTROL DRAWING



DART PART NUMBER	POSSIBLE SUPPLIER	SUPPLIER PART NUMBER	ALTERNATE PART NUMBER	TEMPERATURE WHEN SWITCH OPENS
D4022-5	FARNELL	1006847	3775628	125°F
	HONEST-WELL	T23A125BSR2-15	3775628	125°F
	NEWARK	98K1992	3775628	125°F

D4022-X THERMAL SWITCH

107379
2012-03-02
MP

NOTES:
 1) MATERIAL: N/A
 2) FINISH: N/A
 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
 4) UNITS: INCHES UNLESS OTHERWISE NOTED
 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
 6) DIMENSION: N/A

DESIGN	<i>AS</i>	DART AEROSPACE LTD
DRAWN	<i>DC</i>	HAWKESBURY, ONTARIO, CANADA
CHECKED	<i>E</i>	DRAWING NO.
MFG. APPR.		REV. C
APPROVED	<i>MP</i>	D4022
DE APPR.	<i>MP</i>	SHEET 4 OF 4
DATE	12.02.09	TITLE
		SCALE
		FUEL PUMP
		NTS

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